

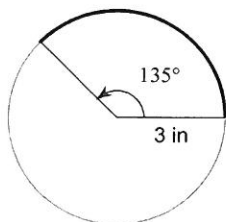
Name _____

Geometry

Date _____ Period _____

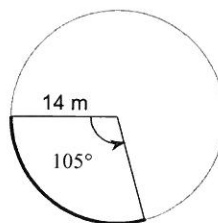
Find the length of each arc.

1)



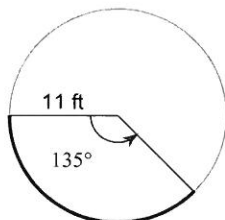
$$\frac{9\pi}{4} \text{ in}$$

2)



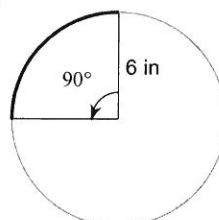
$$\frac{49\pi}{6} \text{ m}$$

3)



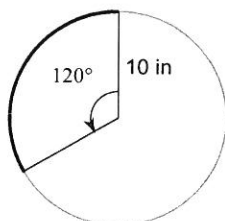
$$\frac{33\pi}{4} \text{ ft}$$

4)



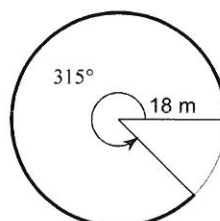
$$3\pi \text{ in}$$

5)



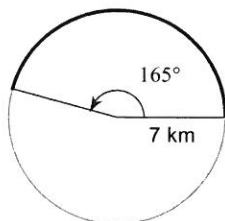
$$\frac{20\pi}{3} \text{ in}$$

6)



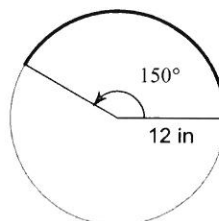
$$\frac{63\pi}{2} \text{ m}$$

7)



$$\frac{77\pi}{12} \text{ km}$$

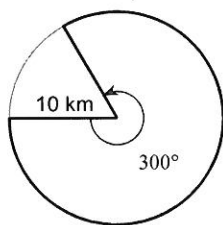
8)



$$10\pi \text{ in}$$

Find the area of each sector.

9)

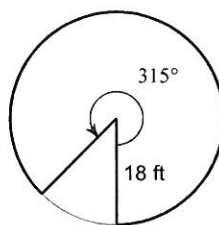


$$\frac{250\pi}{3} \text{ km}^2$$

Handwritten notes:
 $300^\circ = \frac{300\pi}{180}$
 $= 5\pi$
 $\frac{5\pi}{3}$

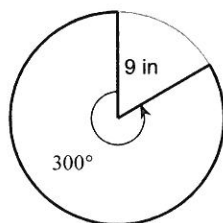
Handwritten notes:
 $\frac{5\pi}{3}$
 $\frac{5\pi}{3}$

10)



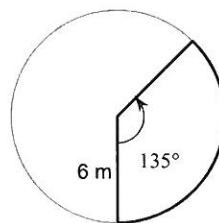
$$\frac{567\pi}{2} \text{ ft}^2$$

11)



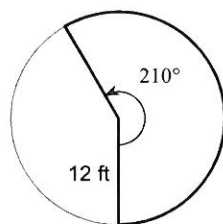
$$\frac{135\pi}{2} \text{ in}^2$$

12)



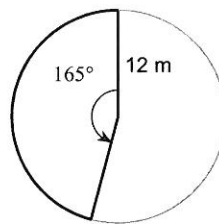
$$\frac{27\pi}{2} \text{ m}^2$$

13)



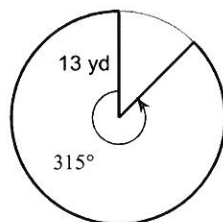
$$84\pi \text{ ft}^2$$

14)



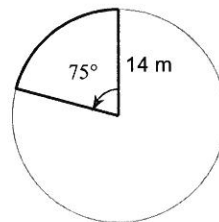
$$66\pi \text{ m}^2$$

15)



$$\frac{1183\pi}{8} \text{ yd}^2$$

16)



$$\frac{245\pi}{6} \text{ m}^2$$